Graphing Functions

Unit 15.5

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| Day | Section | Topic | Assignment |
| 1 | 4.4 | Graphing Polynomial Functions | **Pg 311-312:** 1-8, 21-28 |
| 2 | 4.5 | Finding Asymptotes | Pg 326: 1-8, 15-22 Finding Asymptotes Wksht |
| 3 | 4.5 | Graphing Rational Functions | **Pg 327-8:** 25, 26-40 (even) |
| 4 | 4.5 | Rational Functions – Equations from a Graph | **Graphing Rational Functions Wkst (3 sides)**  **Pg 328:** 41-46 (all) |
| 5 |  | Review | Pg 339-340: 34, 35, 40-49, 57, 58, 60-67 |
| 6 |  | TEST Unit 15.5 |  |

**DAY 1 Pg 311-312: 1-8, 21-28**

**1) A 2) B 3) 1 real zero 4) C**

**5) B and D 6) B 7) **

**8) **

**21 – 28 🡪 SEE DESMOS.COM**

**DAY 2 Pg 326: 1-8, 15-22, Finding Asymptotes Wksht**

**1) A, B, C 2) B 3) A 4) C and D**

**5) A 6)  7) A, C, D 8) C**

**15) VERTICAL ASYMPTOTE: x = 5, HORIZONTAL ASYMPTOTE: y = 0**

**16) VERTICAL ASYMPTOTE: x = -9, HORIZONTAL ASYMPTOTE: y = 0**

**17) VERTICAL ASYMPTOTE: x = -1/2,**

**HORIZONTAL ASYMPTOTE: y = -3/2**

**18) VERTICAL ASYMPTOTE: x = 4, HORIZONTAL ASYMPTOTE: y = 2**

**19) VERTICAL ASYMPTOTE: x = -3, OBLIQUE ASYMPTOTE: y = x – 3**

**20) VERTICAL ASYMPTOTE: x = 1, OBLIQUE ASYMPTOTE: y = x +1**

**21) VERTICAL ASYMPTOTE: x = -2, x = 5/2,**

**HORIZONTAL ASYMPTOTE: y = ½**

**22) VERTICAL ASYMPTOTE: x = 1/5, x = 5,**

**HORIZONTAL ASYMPTOTE: y = 3/5**

**Finding Asymptotes Worksheet**

**1) VA: x = -4 HA: y = 3**

**2) VA: x = 6 HA: y = 3**

**3) VA: NONE HA: NONE**

**4) VA: x = -5 HA: y = -x + 5**

**5) VA: x = 1, -1 HA: y = 0**

**6) VA: x = 1 HA: y = NONE**

**7) VA: x = 0 HA: y = 0**

**8) VA: x = 0, -2 HA: y = 0**

**9) VA: x = 0 HA: y = 3x**

**10) VA: x = 2, -1/3 HA: y = 2**

**11) VA: x = 0 HA: y = -x – 1**

**12) VA: x = -1, 0 HA: y = 0**

**DAY 3 Pg 327-8: 25, 26-40 (even)**

**25) a) C b) A c) B d) D**

**26) a) The oblique asymptote is y = x + 1.**

**b) The function crosses the oblique asymptote at x = 0 and x = 1.**

**c) As x approaches infinity the function approaches the oblique asymptote from above.**

**28 – 40 (even) in DESMOS.COM**

**DAY 4 Pg 328:** **41-46 (all)**

**41)  42) **

**43)  44) **

**45) SEVERAL ANSWERS POSSIBLE**

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**46) SEVERAL ANSWERS POSSIBLE**

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**Graphing Rational Functions Wkst : 1-6 DESMOS**

**1)  2) **

**3)  4) **

**Day 5: Pg 339-340: 34, 35, 40-49, 57, 58, 60-67**

**34) ANSWERS VARY 35) ANSWERS VARY**

**40) 2 41) 3 42) C 43) D**

**44) E 45) A 46) B 47) F**

**48) a)  b)  c) down on left, up on right d) max 7 e) max 6**

**49) a)  b)  c) down on L, down on R d) max 6 e) max 5**











